

# New York State Department of Transportation

## Red Flag NB23U4W024

By: Malav Shah

Flag Date: May 31, 2023

Superseding Information:

This flag supersedes: YF NB2228W024

### Structure Information

**BIN: 1065318**

**Feature Carried: 278I278IX2M23027**

**Feature Crossed: 6TH AVENUE**

**Orientation: 8 - NORTHWEST**

**Region: 11 - NEW YORK CITY**

**County: KINGS**

**Political Unit: City of NEW YORK**

**Approximate Year Built: 1962**

**Posted Load Matches Inventory : Yes**

**Bridge Load Posting (Tons) : Not Posted for Load**

**Primary Owner: New York State Department of Transportation**

**Primary Maintenance Responsibility: 12 - State - Subcontracted to another Party**

**Typical or Main Span Type: 3 - Steel, 02 - Stringer/Multi-Beam or Girder**

**This Bridge is not a Ramp**

**Number of Spans: 322**

### Verbal Notification Information

**Person Notified: Muhammad Mubeen**

**Date: May 31, 2023 12:05:00 PM**

**Of: NYSDOT Region 11**

### Signature Information

**Signature: Malav Shah, P.E. 106620-1**

**Date: June 13, 2023**

**Reviewed By: Robert Kemp**

**Date: June 13, 2023**

**Attachments: 9**

### Flagged Elements

Parent Element	Element	Total Quantity	Unit
<b>Span Number : 236</b>			
	PR831 - Steel Beam End	42	each
	107 - Steel Open Girder/Beam	989	ft

### Flagged Condition Description

This Red Flag No. NB23U4W024 is located at the same location as previously issued Yellow Flag No. NB2228W024.

Location: Span 236 Girder G1 at Pier 236.

The left connection angle of Girder G1 at the connection to Pier 236 exhibits a full height vertical corrosion crack for 1/8"-1/2" wide along the entire fillet section (previously 3" long x 1/2" wide vertical corrosion crack at the lower fillet section).

In addition, the right stiffener connection angle of Girder G1 to Pier 236 exhibits:

1. up to 1/8" section loss in the connecting leg portion, adjacent to the vertical edge of the girder web end,
2. heavy section loss (up to 50% section loss) in the lower portion of the connecting leg (FW x 10"H), below the girder web connection.
3. connecting leg has a Full Width x 1-1/2" high corrosion hole at the base (previously 4" wide x 1-1/2" high hole) and a 2-1/2" wide x 1" high corrosion hole at the top of the stiffener (previously, a 4" wide x 1-1/2" high hole at the base and a 2" wide x 1" high corrosion hole at the top of the stiffener).

**Notes:**

QC Note: This Red Flag NB23U4W024 was initially considered to be issued as a Yellow Flag, superseding the previous Yellow Flag NB2228W024 on 5/30/23. However after further discussions, it was determined to issue this as a Red Flag, which was called into the Region the next day, on 5/31/23. The photographs initially taken on 5/30/23 were maintained for the Red Flag issuance on 5/31/23.

1. The affected member, Girder G1 is a load path redundant steel girder consisting of a web depth of 21.30" inches and thickness of 0.608 inches and is located under the deck in the roadway, approximately 12" off the edge of curb line/safety walk.

2. The adjacent Girder (right) G2 is 5'-3" on center has repair plates in good condition.

3. The adjacent Stringer (left side) S1, approximately 24" on center has corrosion at the top of the right bottom flange angle with 3/16" deep section loss 12" L x 1" wide.

4. A double lane closure on 3rd Avenue Westbound with shadow vehicle and a 35' bucket truck is required to access the flagged location.

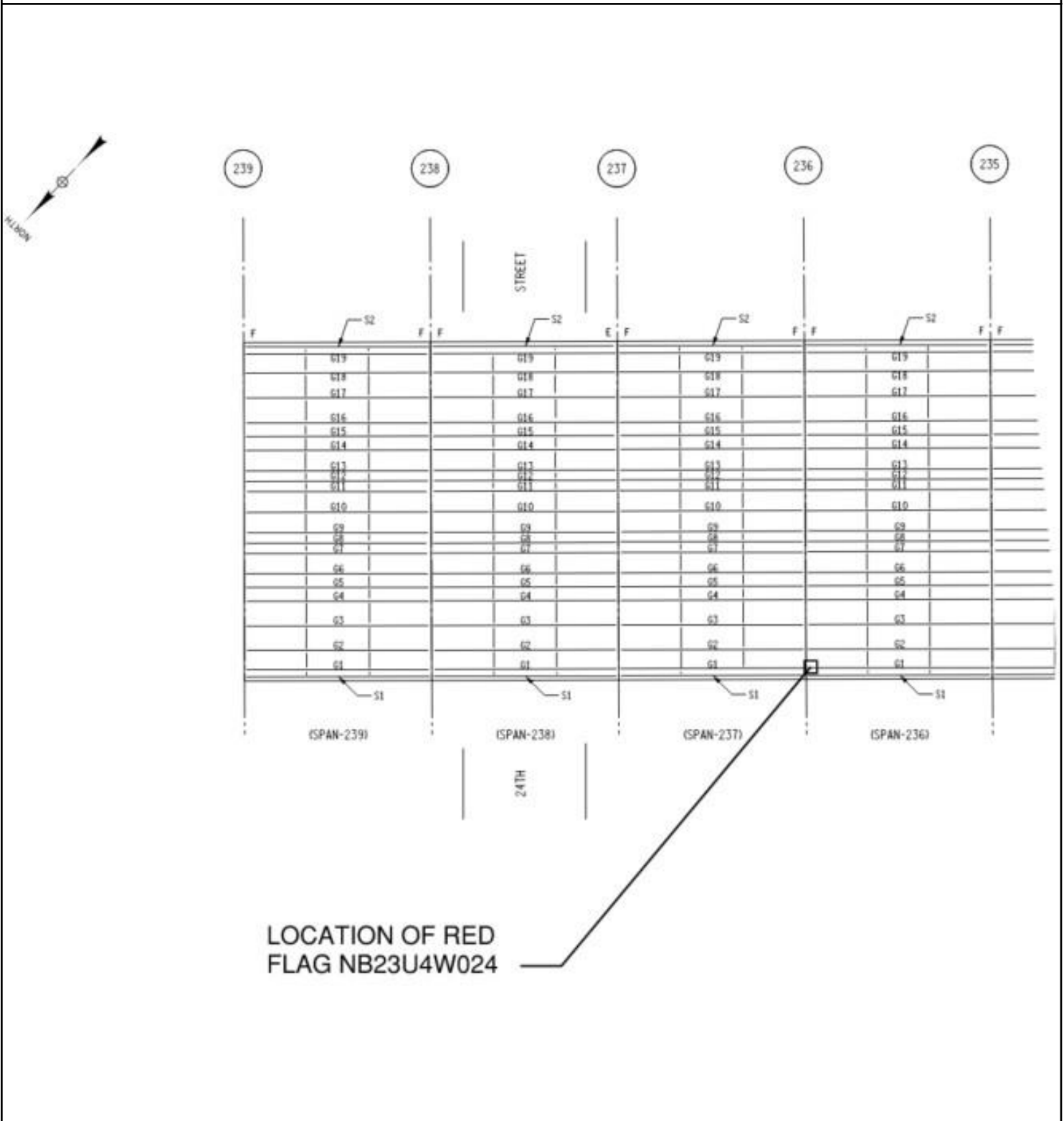
5. The previous 2022 Yellow Flag # NB2228W024 at this location has following description of defect:

The left clip/connection angle at Girder G1 connection to the pier cap at Pier 236 exhibits a 3" long x 1/2" wide vertical corrosion crack at the lower fillet section. In addition, the right vertical stiffener/connection angle is heavily corroded and has a 4" wide x 1-1/2" high hole at the base and a 2" wide x 1" high corrosion hole at the top of the stiffener. There has been no significant change since previous inspection.

Flag Photographs

Photo Number: 1

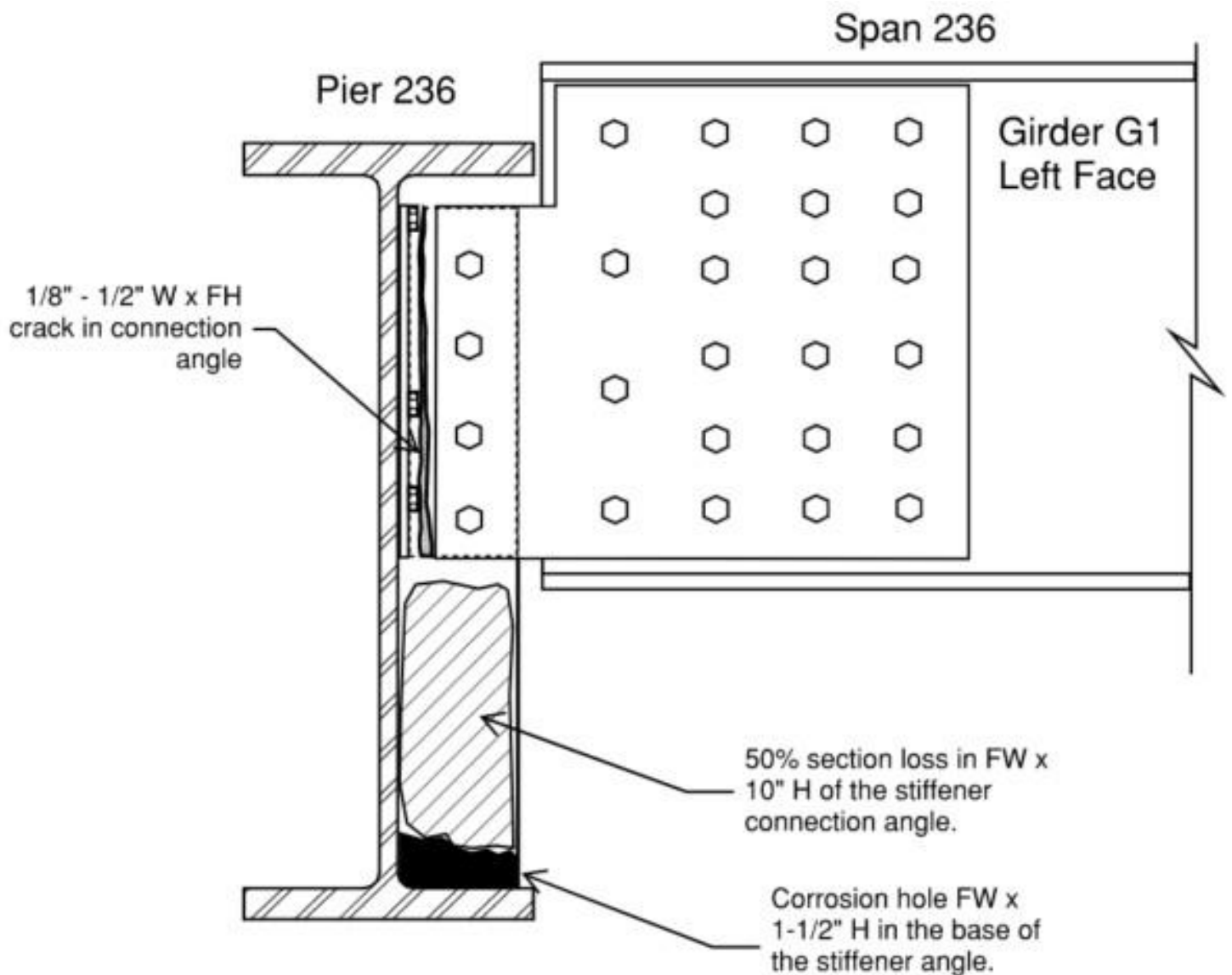
Photo Filename: NB23U4W024 LOCATION PLAN.JPG



Attachment Description: Flag Location Plan

Photo Number: 2

Photo Filename: NB23U4W024 condition sketch 1.JPG

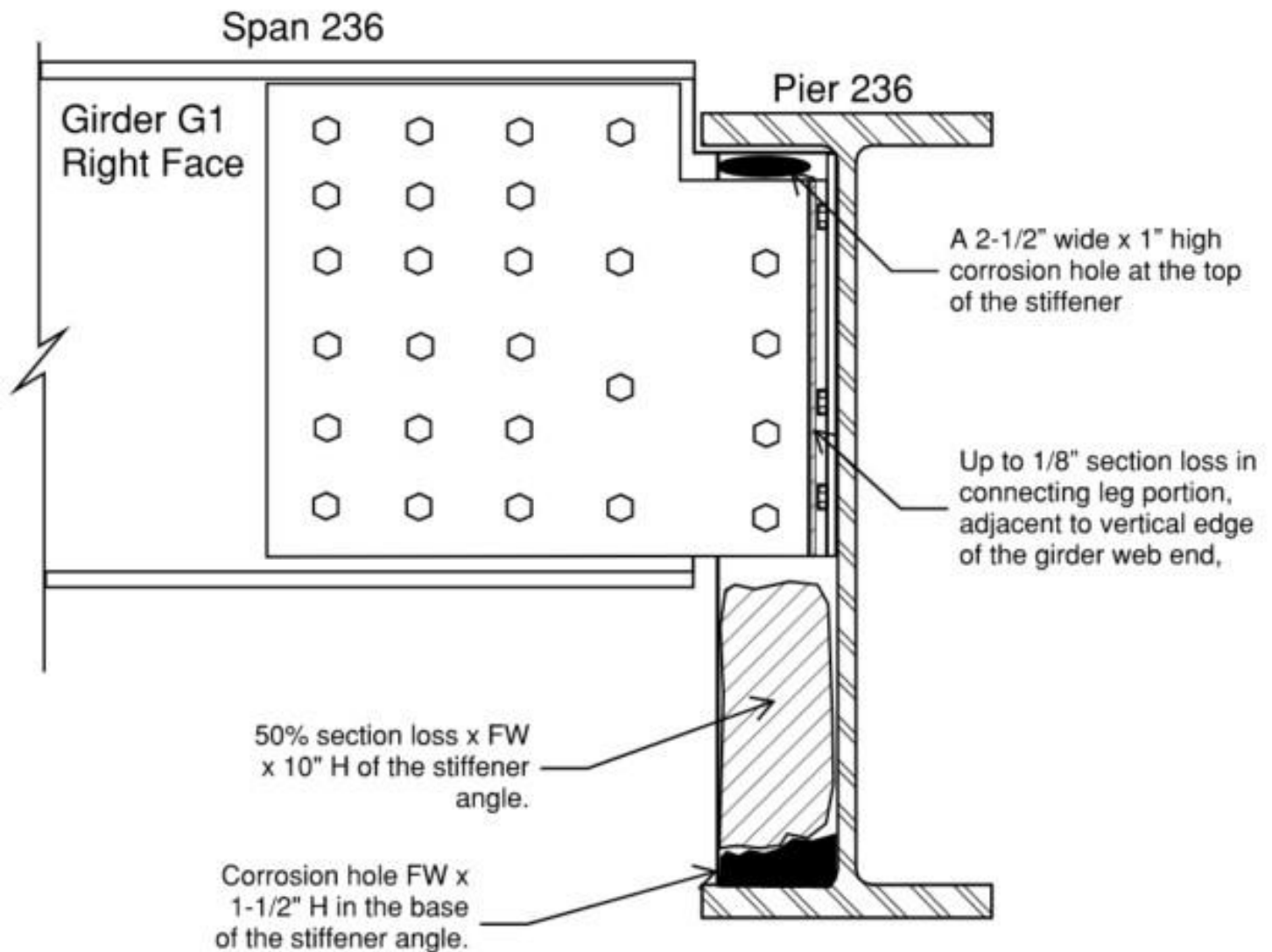


**SKETCH FOR RED FLAG # NB23U4W024**  
**SPAN 236, GIRDER G1 BEAM END AT PIER 236**  
**(LOOKING RIGHT)**  
**N.T.S**

*Attachment Description: Flag Condition Sketch 1*

Photo Number: 3

Photo Filename: NB23U4W024 condition sketch 2.JPG



**SKETCH FOR RED FLAG # NB23U4W024**  
**SPAN 236, GIRDER G1 BEAM END AT PIER 236**  
**(LOOKING LEFT)**  
**N.T.S**

*Attachment Description: Flag Condition Sketch 2*

Photo Number: 4

Photo Filename: P5303348.JPG

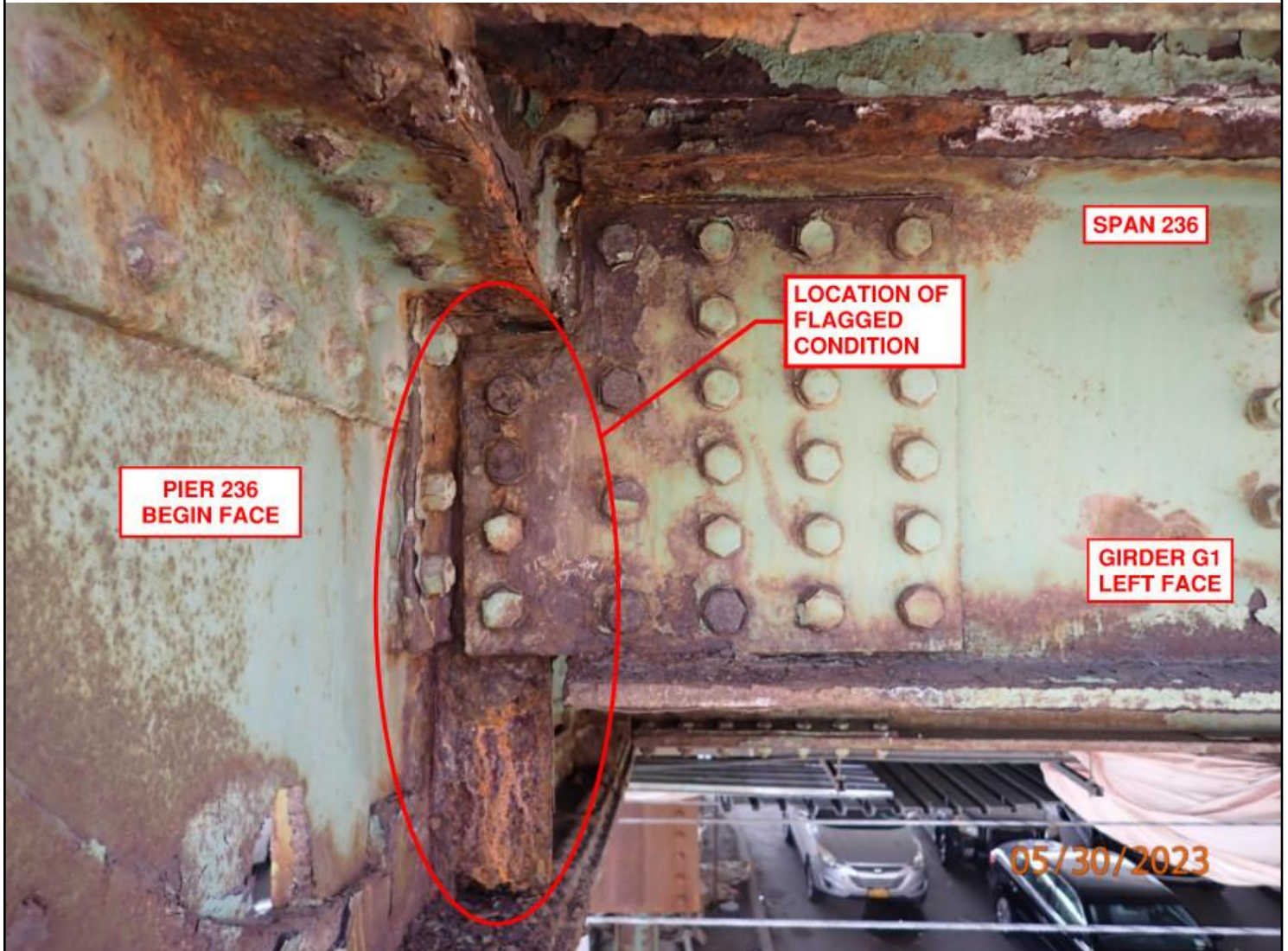


**Attachment Description: General View of Flag Condition. Looking End - Up**



Photo Number: 5

Photo Filename: P5303314.JPG



**Attachment Description: General View of Flag Condition on Girder Left Face. Looking Right.**

Photo Number: 6

Photo Filename: P5303319.JPG

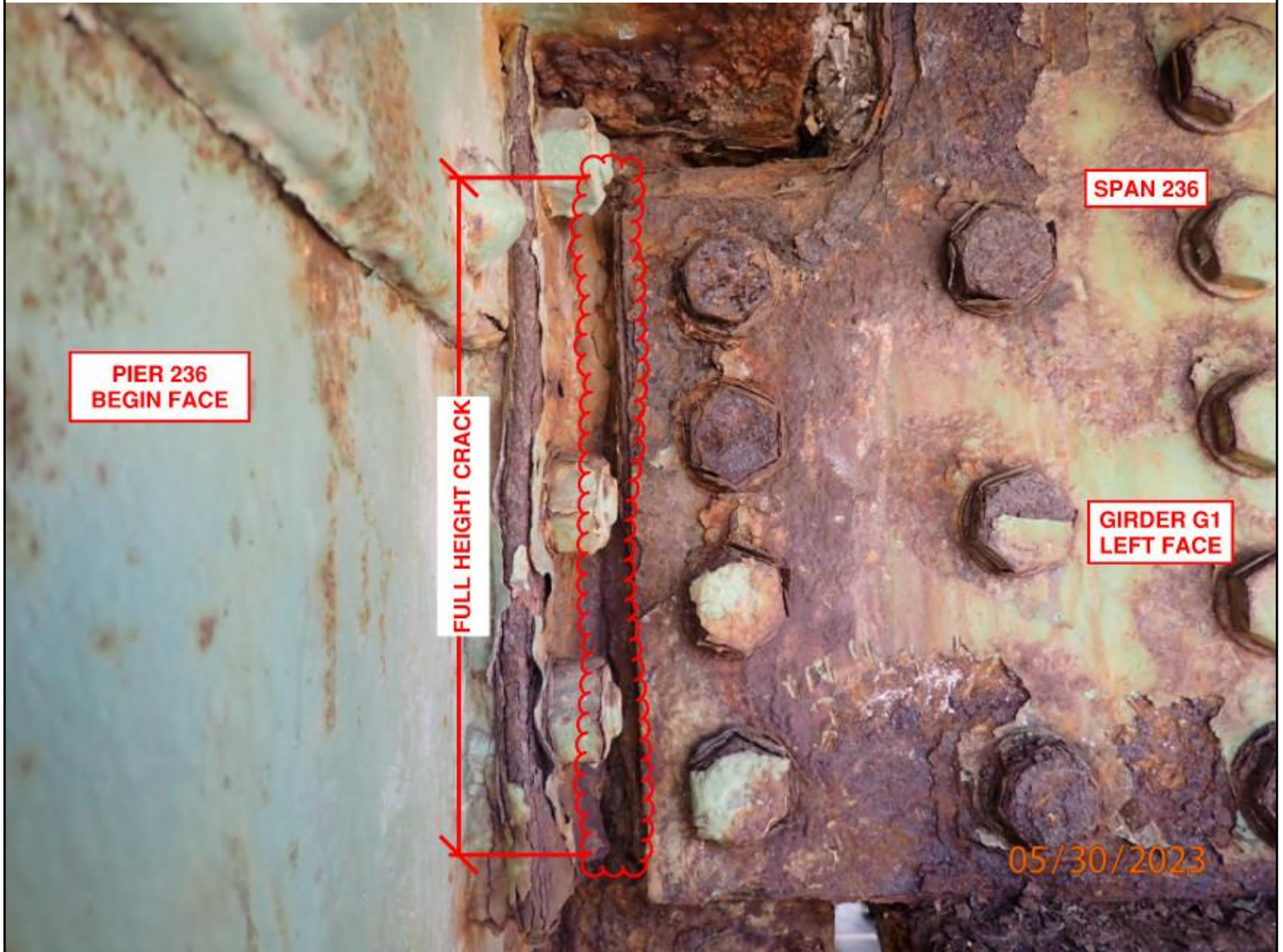


**Attachment Description: General View of Flag Condition on Girder Right Face. Looking Left.**



Photo Number: 7

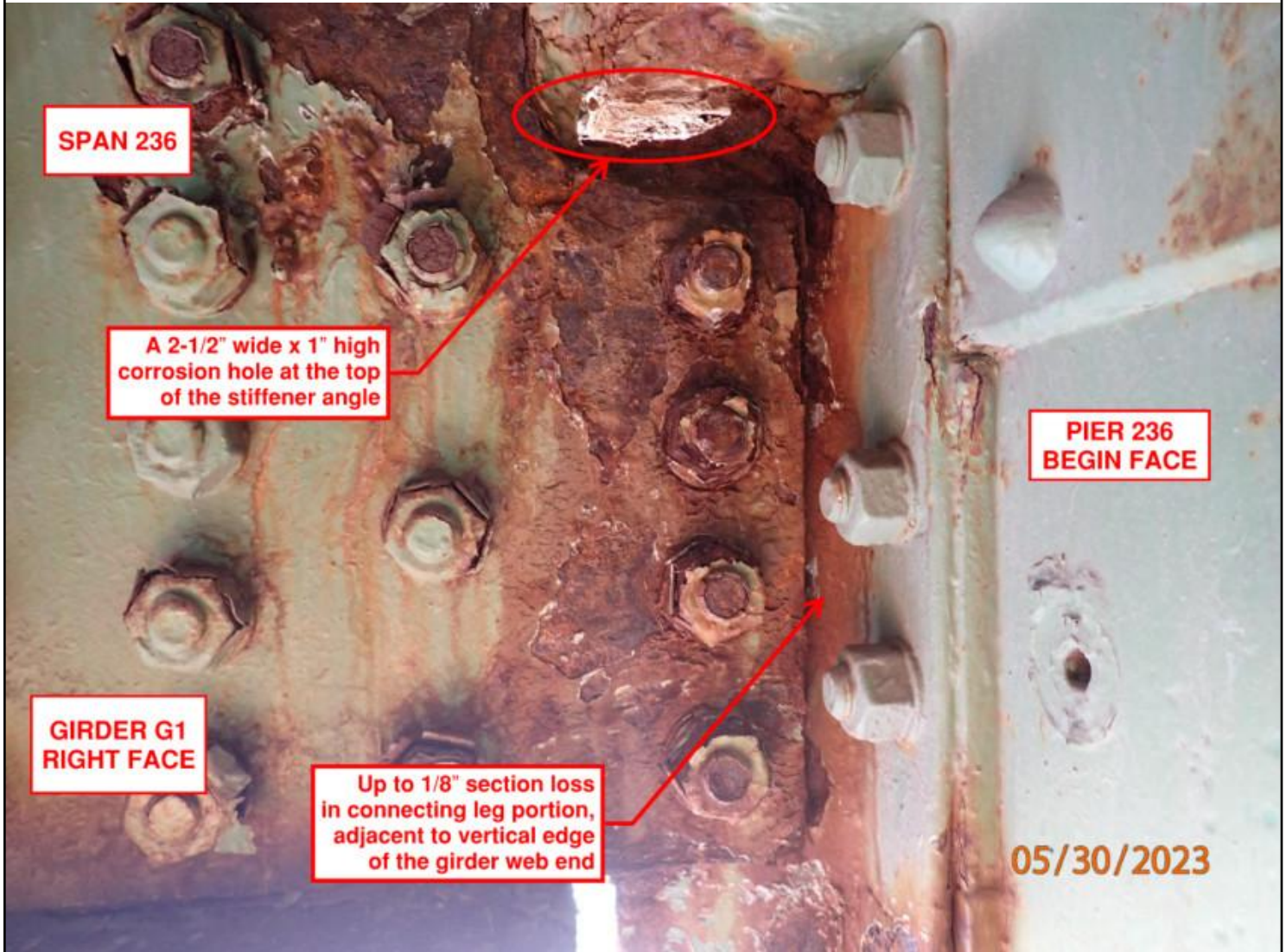
Photo Filename: P5303315.JPG



**Attachment Description:** Connection angle with full height crack (1/8 - 1/2" wide) in the connecting leg. Looking Right.

Photo Number: 8

Photo Filename: P5303323.JPG



**Attachment Description:** Stiffener angle with Up to 1/8" section loss in connecting leg portion, adjacent to vertical edge of the girder web end, and a 2-1/2" W x 1"H hole at the top of the angle leg. Looking Left.



Photo Number: 9

Photo Filename: P5303327.JPG



**Attachment Description:** Stiffener angle with up to 50% section loss in lower portion of connecting leg and a Full width x 1-1/2"H hole at the base of the angle leg. Looking Left.